



Exclusive Safety Packaging

Antibiotic Based [Fuel Ethanol Fermentation]

ENOCK V (*Virginiamycin*)

Virginiamycin formulation designed to control contaminating bacteria by interfering with protein synthesis at the ribosomal level.

ENOCK V PLUS (*High Concentration Virginiamycin*)

Maximum strength Virginiamycin formulation designed to control contaminating bacteria by interfering with protein synthesis at the ribosomal level.

ENOCK P (*Penicillin G*)

Single component antimicrobial designed to address problematic bacteria by inhibiting cell wall synthesis.

ENOCK E (*Erythromycin*)

Single component antimicrobial containing Erythromycin. Erythromycin is effective against a broad spectrum of gram-positive bacteria that is not well controlled by Virginiamycin or Penicillin.

ENOCK BLENDS

(*Customizable Formulations*)

- Enock 70-30 (70% Virginiamycin/30% Penicillin)
- Enock 50-50 (50% Virginiamycin /50% Penicillin)
- Enock 30-70 (30% Virginiamycin/70% Penicillin)

Combination of antibiotics to inhibit a broad range of both gram-negative and gram-positive fermentation contaminants.

Note: Antibiotic Packaging: 0.5 lb or 1 lb. water soluble packaging in 25kg fiber drums.

ENOCK ZX

Powerful macrolide fermentation antibiotic effective against both gram-positive and gram-negative bacteria via bacterial protein synthesis inhibition.

ENOCK ASSIST

New, patent-pending GRAS approved formulation that simultaneously enhances the efficacy of traditional antibiotics and reduces the dosage required. Enock Assist augments the antimicrobial mechanisms and resulting in less antibiotic residue in the distillers grain.



Antibiotic-Free and Front-End Antimicrobials

DEFENDER (*Proprietary Antibiotic-Free*)

Gram-negative/gram-positive antimicrobial solution designed for utilization in beverage and fuel ethanol fermentations. The Defender byproducts are natural — amino acids, urea, and ethanol. Defender is an excellent choice for high protein grain, for aquaculture, or where antibiotic residue is not desired.

Hops Acid Formulations

ENOCK ALPHA

30% Alpha-Acid based, Hops Acid formulation designed for biofuel propagation/fermentation processes.

ENOCK BETA

Beta-based, Hops Acid formulations (10% and 45% concentrations) intended for sugar and beverage.

Chlorine Dioxide

ENOCK ENHANCE (*3000 Ppm Chlorine Dioxide Solution*)

Designed for use in final CIP rinse and front end applications, primarily heat/beer mash exchangers, scrubbers, fermentation fill lines, etc. Superior to iodine in disinfection.

ENOCK SSC (*15% Sodium Chlorite*)

Antimicrobial solution designed for application at start of fermentation, utilizing the fermentation process to create low levels of chlorine dioxide for antimicrobial control.

ENOCK YVE-013

Proprietary technology that stimulates yeast growth and reduces gram-negative bacteria in the propagation sequence of both beverage and fuel ethanol processes.

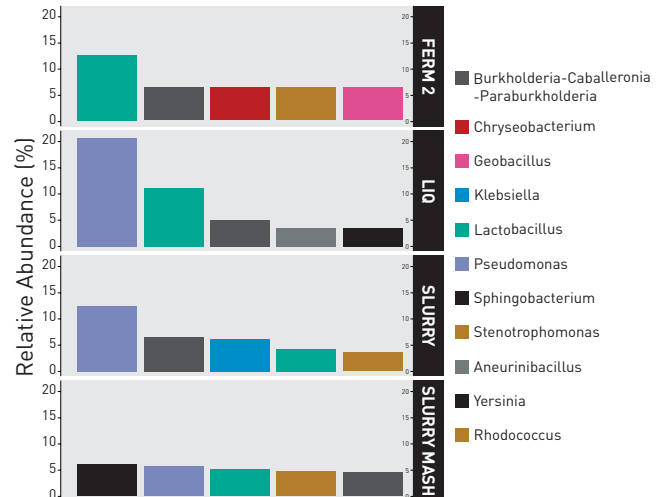


Archangel GenesisGene™

DNA Microbiological Monitoring



Exclusive to Archangel, our new DNA technology not only details all bacteria in your process, but does so to the precise percentage. GenesisGene™ is the first technology that facilities can utilize on site to diagnose problematic system operations and devise treatment options in a matter of hours, vastly reducing financial losses due to infections.



Archangel – A Technology Based Company

Industry Exclusive to Archangel

- GenesisGene™ – DNA microbiological monitoring
- Product Safety Packaging – Industry First to protect personnel
- Enock Assist – Technology to reduce and enhance antibiotic usage
- Most Comprehensive Antimicrobial Product Line

Archangel combines technology with products to dramatically change the nature of how facilities manage their process.

Technical Support and Laboratory Capability

Archangel provides onsite technical support personnel in addition to laboratory support to include:

- Exclusive New GenesisGene™ DNA Microbiology Analyses (Onsite & Laboratory)
- HPLC
- Fluorescent Microscopy
- Jar Fermentation



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